

So you're going to be a KMO?

A Competency Model for a Knowledge Management Officer

MAJ Michael McCarthy
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"A competency is defined as a set of skills, knowledge, attributes and behaviors that are observable and measurable. It is the ability to perform activities to the standards required in employment, using an appropriate mix of knowledge, skill and attitude. All three aspects must be present if someone is to be effective in the workplace. To improve competence, you need to increase not only your knowledge, but also your understanding of how the knowledge can be applied, and your skill in applying it."

--USAREUR G1-Civilian Personnel Directorate

Knowledge superiority is the dominance in the **flow of knowledge** and **expertise** through personalization and codification of one side over the other sufficient to win the **learning competition** in counterinsurgency and persistent conflict .

GEN. David H. Petraeus, *Military Review* (SEP / OCT 2008), 4

“What is Knowledge Management?” I remember thinking after I heard that my Functional Area 57, Simulations Operations, acquired the Knowledge Management Officer (KMO) mission. At that point, I was not familiar with Knowledge Management (KM) or any of its concepts or procedures. Then, a few months away from graduating Intermediate Level Education (ILE) I got “the” phone call. It was my assignment officer congratulating me—I was going to be the KMO at a division. “#@%\$! What do I do now?” I thought. What does a KMO do and how do I learn it as fast as I can?

I didn’t have much time. My challenge was learning about Knowledge Management without any prior experience in the KM field and both understanding and developing the competencies needed to be a successful KMO. I started on this journey confused about not only the subject matter, but about the duties, responsibilities, and environment in which I would likely have to work. With some help along the way from coaches, mentors, and peers, I found and built a roadmap that has left me better prepared for my next job. I’d like to share my story in an effort to help you understand and develop a path to the skills, knowledge, and attributes I found important for a KMO.

My journey can be explained in two phases. First, I had to find out more about knowledge and KM and second, I needed to know how to become a competent KMO. I started with FM 6-01.1 Knowledge Management Section, which defines KM as:

KM is the art of creating, organizing, applying and transferring knowledge to facilitate situational understanding and decision making. KM supports improving organizational learning, innovation, and performance. Effective KM provides commanders and other decision makers’ knowledge products and services that are relevant, accurate, timely, and useable.

While this definition is useful, it still didn’t help me get my mind around what seems to be a nebulous concept. The best definition for Knowledge Management I’ve seen is from my instructor and KM coach at ILE:

“KM is a deliberate approach to help organizations assess, plan, create, acquire, organize, integrate, maintain, transfer, and effectively use and reuse what they know (both tacit and explicit) to achieve a sustained competitive advantage.”

“We must manage the knowledge environment...not just ‘the knowledge’” (Prevou, 2009)

That definition opened my eyes. Up until this time, my initial thoughts of KM were information technology (IT) based. Although it is a part of KM, IT is more of a conduit to support the knowledge flow, an enabler, like a telephone to support a conversation. I quickly came to understand that KM did not equal IT. KM is much more.

I also learned that knowledge is not simply what we can write down. It is more than data and information. Knowledge is both tacit (the knowledge in our heads) as well as explicit (what can be written down) and that we must treat them differently. They flow in different ways and both are required to be effective.

Tacit Knowledge

- Is personal, context-specific knowledge that is difficult to formalize, record, or articulate: it is stored in people’s heads. Tacit knowledge consists of various components such as intuition, experience, ground truth, judgment, values, assumption, beliefs, and intelligence.

Explicit Knowledge

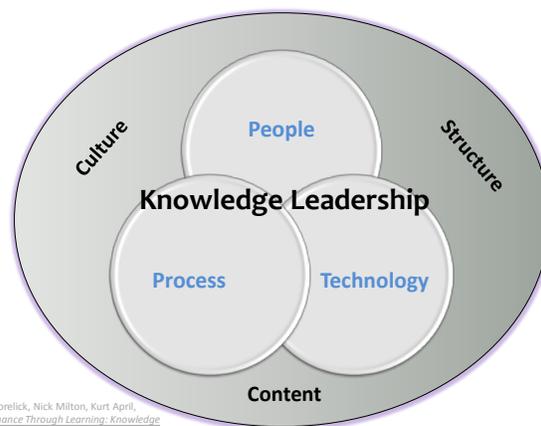
- Is that component of knowledge that can be codified and transmitted in a systematic and formal language: documents, databases, webs, email, charts, etc.

Different types of knowledge require different approaches and systems to help them flow through the organization. The range of approaches run the spectrum from very low need for human-to-human interaction but high need for human-to-system interaction for more explicit knowledge, up to the need for higher human interaction the more tacit the knowledge. Very deliberate methods for extracting and capturing tacit knowledge exist (like the cognitive task analysis), but I don’t have time to discuss them in this paper.

I also realized there are many frameworks for dealing with knowledge and KM. The one that was easiest to understand and the one that made the most sense for the Army application was the idea of managing the knowledge environment. One of my biggest concerns was understanding the concept of KM, and the framework of the environment helped me clarify specific components that we can manage to improve knowledge flow. And flow is what KM is all about.

The knowledge environment consists of seven major components: People, Processes, Technology, Structure, Content, Culture, and Knowledge Leadership (Figure 1). “People , processes, and technology are interlocked and dependent upon one another. They flex as the organizational needs change. Structure, content, and culture are independent and affect all three of the interlocked components, while knowledge leadership lays across the top of all and provides vision, drive, resourcing, and often motivation for an effective KM program. The purpose of this knowledge environment is to make knowledge flow” (Prevou, Sep 2009) so that it is available to support decision-making and learning.

Components of a Knowledge Environment



Carol Gorelick, Nick Milton, Kurt April, Performance Through Learning: Knowledge Management in Practice, 8 (Figure 1-1)

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Figure 1: Components of the Knowledge Environment

Here is how I came to understand the components of the knowledge environment (Prevou, Dec 2009):

- **People**—the relationships and interactions between people, both inside and outside the organizations; the interactions between people and systems; and the skills, knowledge, and attributes people bring to the team. This component includes how people connect in networks as well as hierarchies, how they collaborate, and the training required to maintain proficiency and the attributes that foster lifelong learning.
- **Processes**—the formal methods for assessing, creating, acquiring (finding), capturing, organizing, integrating, managing, and transferring knowledge, both tacit and explicit, so that we can make it actionable—to apply the knowledge for some competitive advantage.
- **Technology**—information systems used to put knowledge products (explicit knowledge) and connect people (tacit knowledge) through services to facilitate flow. Technologies are key to enabling knowledge flow but, on their own, are not KM. Data and information in a repository, stationary and not actionable, is not knowledge (it is data or information).
- **Structure**—the KM organizations, KM doctrine and policy, standard operating procedures (SOPs), IT infrastructure, knowledge transfer systems (both vertical and horizontal like a staff battle rhythm or Boards, Bureaus, Centers, Cells and Working Groups [B2C2WG] structure), and training systems within the organization that help us support and manage the people, processes, technologies, design, and conduct the training, establish, and oversee the governance.
- **Content**—the physical form our knowledge takes – tacit and explicit. It is our intellectual capital. It can consist of data, information, knowledge, and wisdom. Its form determines how we capture, store, and transfer it throughout the organization.
- **Culture**—the way the organization does business that enables it to leverage its relationships, knowledge, expertise, and experience to support knowledge flow, knowledge creation, and transfer. A culture of collaboration is required for the Army to become a learning organization. The obligation to share what we know.
- **Knowledge leadership**—effective KM requires both top down leadership and vision as well as bottom up ingenuity, creativity, and passion for excellence. It is the champion of the KM movement who prioritizes and resources KM, practices KM, and sets high standards for subordinates. A knowledge leader will:



Figure 2: Codification versus Personalization

Once I understood more of KM, I had to get a handle on what a KMO does. I looked for a competency model but none exist for the KMO yet. Dr. Prevou is conducting research into the skills, knowledge, and attributes of the KM workforce in general and offered the following model as a way to look at any new job.

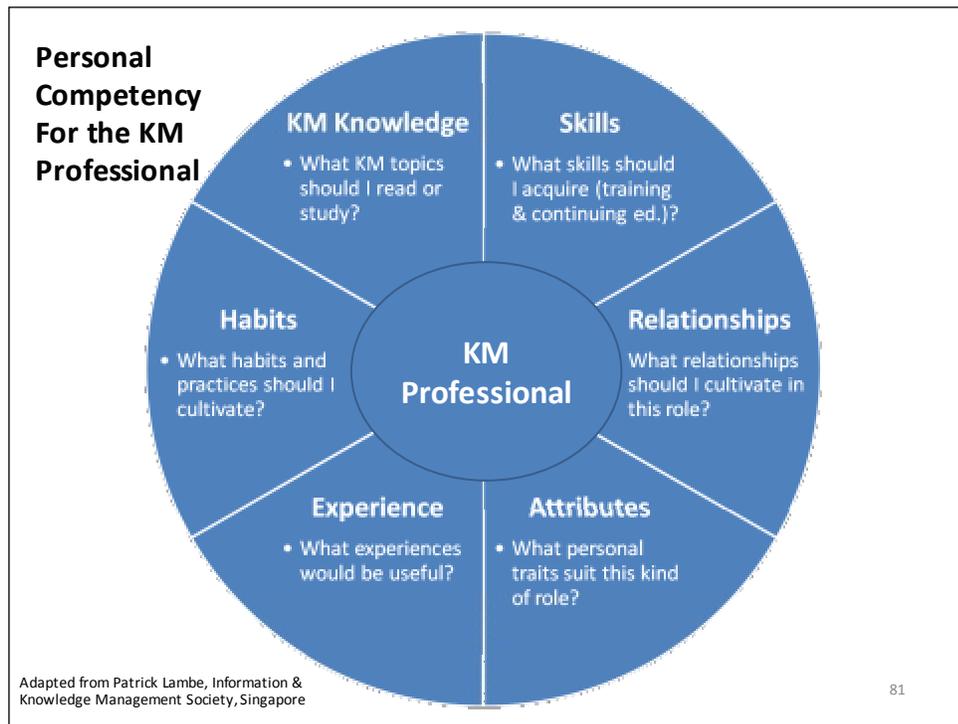


Figure 3: Personal Competency Model for the KM Professional

The answer to these questions is highly personal and may differ from unit to unit or organizational level to level but it was a good place to start. I asked myself and sought the answer to the questions in the following six areas:

- **KM Knowledge:** What topic should I read and study?
- **Skills:** What skills should I acquire?
- **Relationships:** What relationship do I need to cultivate?
- **Attributes:** What personal traits are suited to the role of the KMO?
- **Experience:** What experiences will be useful to me professionally?
- **Habits:** What habits should I cultivate?

And so the journey continued. We were reminded that “What you know shapes what we do.” I wanted to be sure I understood the breadth and depth of KM and did not bring a bias to this answer. I consulted peers, mentors, and colleagues using my rapidly growing social network and the network of Army KM practitioners.

First, I researched what KM topics to read. I downloaded the latest ATTP 6.01-1. I bought a used edition of the *Complete Idiots Guide to Knowledge Management* (no kidding), and I read *Our Iceberg is Melting* by John Kotter. I found a number of articles, whitepapers, and briefings that gave me insights into KM and my role as a KMO. KM Net on the Battle Command Knowledge System (BCKS) network was a great place to look and the community was always helpful in recommending what I should read and study. Here is a little of what I found.

The latest ATTP 6.01-1, Knowledge Management, gave me the broad understanding of KM but was very conceptual in nature. It is also a bit dated as I understand it was written about four years ago and only recently published. Four years is an eternity for this emerging discipline as over 200 works on KM have been published since then. While the FM (now an ATTP on the milwiki site) provided a good explanation of functions and structure for a KM section at Division, it was lacking in the more recently published KM principles and processes. It's a must read but its only the first step.

The *Complete Idiots Guide to Knowledge Management*, per the title, helped me develop an understanding of KM and the applications explained to the lowest common denominator. This book was set in an environment that fosters KM, and while it's not tailored to the military, much of the concepts and approaches are applicable. It's a great desk side reference, understanding of course that the Army definitions do differ.

What if I am in an environment that does not foster or appreciate change or collaboration? From my discussions with others I learned that KM was very much about managing change, and the KM leader must have a deliberate process to follow. The third book I read, *Our Iceberg is Melting* by John Kotter, is about change in organizations. Kotter provides a simple eight-step model to help manage that change. He advocates that setting a vision of the future state, quick action to confront issues, group buy-in of the whole organization, quick wins, and sustained effort make change stick. The goal of replacing old habits with new behaviors and making them stick falls right in line with KM in our operating environment and implementing a KM strategy in the new organization. This was a quick and valuable read.

Fourth was the KM fundamentals brief by Dr. Prevou. This all encompassing KM briefing covered the gamut and made the concepts and approaches easy to understand and applicable to the military. Many of the concepts were emerging ideas by him and other thought leaders in the KM field and most of the concepts and slides in this paper derive from what I learned in those sessions..

Additionally I read the papers listed below to provide some depth into specific applications of KM knowledge capture and transfer in the military. I realize this has only scratched the surface, but KM Net provides a longer list of what to read in its KM Books topic. All these articles and books gave me the broad understanding of KM and a foundation to begin the KMO job.

- *KM Principles* by Bob Neilson
- Knowledge Shared Is Power by Major P. Michaelis and Major E. Spain, *Leader To Leader Magazine*, West Point, 2006
- Knowledge Management (KM) Overview, U.S. Army Central (USARCENT), Colonel J. Williams, 8 Dec 08

- *Teams of Leaders Coaching Guide: Building Adaptive, High-Performing Interagency Teams*, by Prevou, Veitch, Sullivan, June 2009
- *Discovering the Invisible: Using Tacit Knowledge to Develop Agile and Adaptive Leaders*, by Holly C. Baxter, Lisa M. Stevens, LTC J. Koskey, Dec 2006
- *The Knowledge Management Team: KM Infrastructure and Architecture*. White Paper for the Command and General Staff College, Mike Prevou, Dec 2009

I realize there is much more information and that continuous self study and learning is needed to stay current on KM. My future reading list includes:

- *Common Knowledge* by Nancy M. Dixon
- *The Starfish and the Spider* by Ori Brafman and Rod A. Beckstrom
- *Knowledge Management Handbook* by Jay Leibowitz

My next challenge was to determine what skills I needed to acquire to be a successful KMO. I built a simple mind map (see Figure 4) with the help of Dr. Prevou and organized the required skills into categories. There is no science or research behind this model; rather, lots of reading and conversations in which we laid out topics and skills and then determined where I would acquire each skill. The more I learned, the more I knew where my gaps were in both knowledge and skills. We saw this as a living framework that should evolve in each type of organization and at each level of practice. The novice's mind map would be significantly different than the expert's map. My map was built around the components of the knowledge environment. Yours may differ.

The next step would be to break down the numbered topics in each square box to determine the specific training and education required and a source of that training. This is by no means a completed map, but it did get me started. It was a very productive exercise that I encourage all to try.

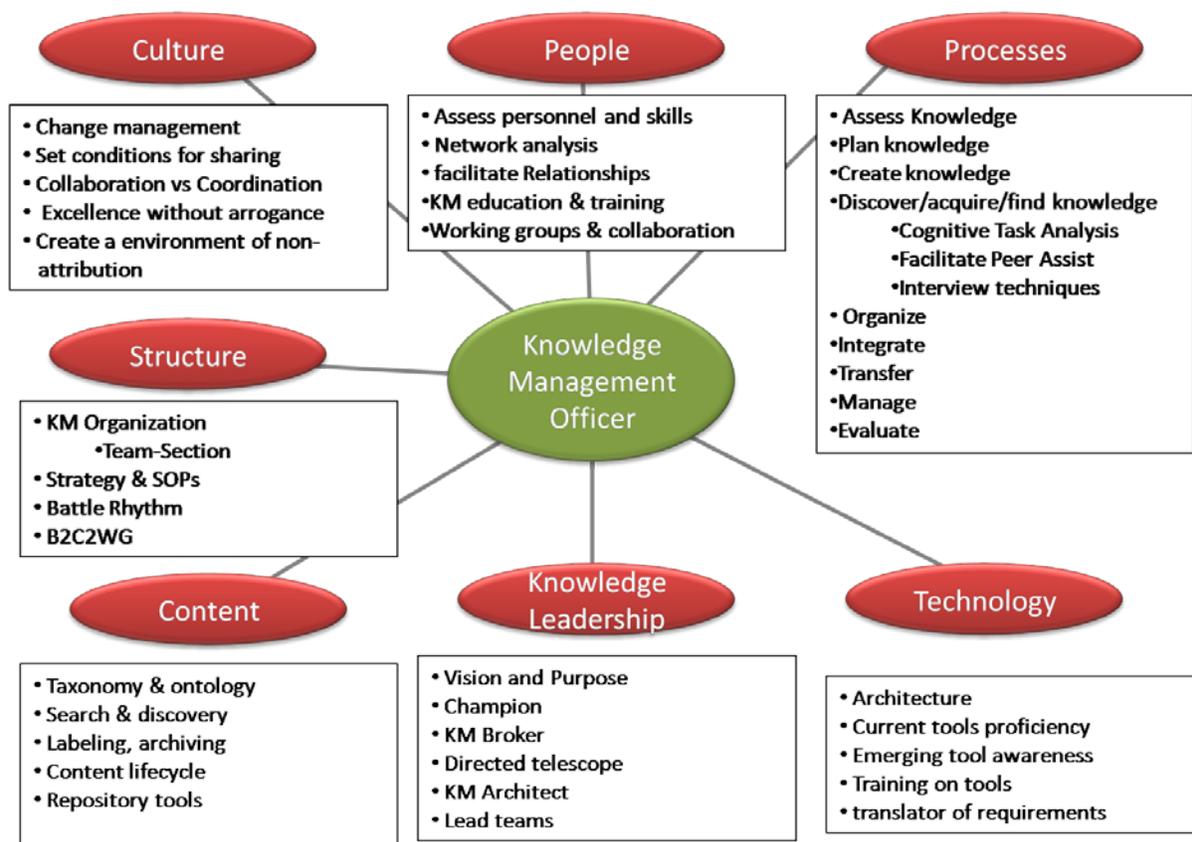


Figure 4: KMO Mind Map of required skills

The third question I explored was what relationships I need to cultivate as the KMO. As a KMO, I have to set favorable conditions for people to share knowledge, experiences, and insights in a collaborative learning environment to maximize managing knowledge. This knowledge will ultimately help commanders and other decision makers achieve situational understanding to make informed decisions.

Again we made a mind map and identified some of the key groups I needed to get to know. My list includes:

- KM Experts
- Key functional leaders on the staff
- Chain of command
- Peer KM practitioners
- Working Group leaders
- Technology specialists

My thinking was not only who can help guide and teach me, but who can I most impact in my new job. I also wanted to identify the key application experts at the unit so I could enlist their help in building the tools and apps we would need to enable knowledge flow.

Since KM is based on collaboration, I decided to reach out to experts in the field with my second phase of developing KM skills. As a CGSC student, I took a KM elective to be introduced to the basics of KM. I asked my professor, Dr. Prevou, to gear my class towards KM at the division level when possible. I sought experts in the KM field for face-to-face meetings on the latest techniques such as

tactical SharePoint and B2WGC2 and on designing and operating a tactical web portal on SharePoint. Mr. John Nelson at BCKS provided many great insights into how KM could enable the knowledge flow through the B2WGC2. One of the milestones in my development was attending the 2009 Knowledge Management conference in Kansas City for a “hands on” approach to learning and connecting with other practitioners. This proved to be a great move and I had more offers of help than I could manage.

The KM conference was enlightening and informative. The biggest eye-opener was guest speakers Brigadier General Batschelet and Major Caldwell. BG Batschelet was the DCG of 4th ID and MAJ Caldwell was the KMO. Their presentation discussed how they improved KM operations to increase the Commander’s effectiveness and achieve mission success in the counterinsurgency (COIN) environment. Through effective KM procedures, Force Protection and OPSEC increased, which reduced time for allocating resources down at Battalion and lower and increase situational awareness through simultaneous and parallel information processing.

Another eye-opener was the Team of Leaders presentation. The Teams of Leaders concept describes a high-performing leader-team whose members are from different organizations, cultures, agencies, or backgrounds and who each bring specific knowledge, skills, and attitudes to the cross culture Joint Interagency Intergovernmental and Multinational (JIIM) effort. Members often represent a parent agency, organization, or country and come with varying backgrounds, skill sets, motivations, and agendas as they interact to accomplish a common mission or objective. Due to the complexity of dynamic hierarchy, each member of the team may find themselves in a lead role of project or effort execution. With geographic disparity, the team must use cutting edge team communication tools, effective collaboration processes, and advanced learning in the form of judgment exercises and decision games, teams can increase their performance exponentially. This process is being used more and more in the complex operational environment of today, so knowing the basics of the concept is a foundation for anyone transferring to an assignment with JIIM capability. It provided many great insights into virtual teaming and ways to improve collaboration across your network of usually disparate actors.

The fourth competency area was to take a hard look at the attributes I needed to be good at KM. Once I worked through the entire competency wheel with my instructor, I was thinking maybe I should have started with this competency area. If I don’t have the attributes of curiosity, being a self starter, lifelong learner, problem solver, connector, teacher and facilitator, then I am probably in the wrong job. This job requires that you genuinely want to help make the organization more effective. I found you need a systems approach mentality and a basic understanding of technology so you are not afraid to try new applications and methods. I found it necessary to be a good listener, to like people, and be willing to invest time in relationships and networking and to be open minded. I saw this lack of open-mindedness as one of the biggest challenges in this emerging profession.”The not invented here mentality or the KM = IT approach is crippling the art of the possible” (Prevou, 2009). The bias many bring to the table keeps us in a box and prevents us from seeing where domains overlap and effectively solving new and emerging problems.

The next areas I needed to explore were experience and habits in KM. I started to incorporate KM as part of my classes at CGSC. I missed the opportunity to play the KMO role during course exercises as I

did not know of my pending assignment at that time. Had I known, I could have used that time to effectively build experience in the simulated environment. I did actively played the role of a knowledge broker—a person who manages the information flow and helps connect those in need with those who may have it. To do this successfully you have to step back and take a broader view of the operation. You attend lots of meetings and stay abreast of decisions and information requirements. To further my experience with the KM tools, I developed AKO web pages for every elective class I took. This allowed for collaboration on projects outside the classroom but also gave flexibility on when and where to contribute. I also developed naming conventions for our class data and pushed out as many lessons learned as I could. I participated in the KM Community of Practice on KMNet and talked to a number of KMers who described how they had identified requirements for software and applications, implemented change in an organization, and conducted KM during a contingency operation. It wasn't like being there but it did help. In the future I would suggest the potential KMOs at ILE serve as the exercise KMO to get the full experience of plan, prep, and executing KM during a real operation. It might even be possible for ILE students to attend a BCPT rotation as an assistant KM OC/T to get a unit's perspective first hand.

The last competency area was to start building habits that would serve me well as a KMO. Again we turned to the whiteboard and the mind map to discuss the potential habits I would need to develop. Some seemed like blinding flashes of the obvious but having a deliberate approach ensures that I will practice them until they become habit. Among those habits for the KMO I listed:

- Collaborating – Building briefings, documents, and requirements statements virtually, online using tools like Defense Connect Online (DCO).
- Connecting people routinely that may have a common interest or need.
- Sharing everything relevant without overloading others with spam. The key here is understanding who needs what and helping them get it. If they are successful in their jobs, I will be successful. I must set the example for a collaborative culture.
- Patrolling the three to four critical sites for my unit and my profession. I do a quick scan of these select sites each morning just as one scans for the news and sports.
- Reaching back to experts in my network and pushing forward the relevant knowledge or connection. Once I practiced the skills, I needed reach-back capability when I run into a problem. I joined the communicator, talked to the experts at BCKS, and subscribe to professional journals.

In summary, KM is a continuous process that is a balance of both art and science. It is a relatively new discipline less than 20 years old so it is not surprising that we are in such a state of exploration, and sometimes confusion. It is not a field for checklist-minded people. It requires critical and creative thinking to deal with new and emerging ways to solve problems. Automating old and broken processes won't get us the measured improvements we seek. KM has evolved from the early generation of IT centric document capture and storage in databases, to actively moving the objects through systems, to connecting people in discussion about best practices centered on real problems to the leading edge of the fourth generation of KM, which is focused on collaboration and expertise development (Prevou 2007).

Army Operational KM has few practitioners, and the Army has just recently approved KM organizations at ASCC, DIV, and Corps. FA 57 has only been assigning officers to BCT DMO positions for the last couple of years. The KM Qualification course is still in its pilot phase and growing exponentially and is currently the only KM training course available for KMOs.

The key to KM is people—building relationships and connecting with the experts in whatever field they are working and connecting them across boundaries. KM is not a “one-size-fits-all,” like a set of golf clubs; we need different clubs for different situations. If we continue to apply the technology club to every situation, we will never get out of the rough and break par.

KM is not a fad or buzzword, it here to stay. The demand for effective KM was created by the overload of information, the need to foster and make more informed and faster decisions, the demand for continuous learning and adaption, and the failed expectations of technology to deliver the KM promise.

Knowledge is social, and balancing each component of the knowledge environment is critical if the Army is to win the learning competition that GEN Petraeus spoke of in his 2008 *Military Review* article and for the Army to become a real learning organization.

The development and use of this KM competency wheel has helped me organize my thinking and approach for becoming better KMO. I hope you will try it as well.

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